UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/158,076	09/22/1998	JUN ASADA	1046.1192/JD	3503

21171 7590 05/18/2007

STAAS & HALSEY LLP
SUITE 700
1201 NEW YORK AVENUE, N.W.
WASHINGTON, DC 20005

EXAMINER	
LONSBERRY, HUNTER B	
ART UNIT	**PAPER NUMBER**
2623	

MAIL DATE	DELIVERY MODE
05/18/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	09/158,076	ASADA, JUN	
	Examiner	Art Unit	
	Hunter B. Lonsberry	2623	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *09 February 2007*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-8 and 10-21* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-8 and 10-21* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to claims have been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

2. Claims 1, 2, 6 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,282,714-B1 to Ghori in view of U.S. Patent 55,794,116 to Matsuda, U.S. Patent 3,649,764 to Maillet, U.S. Patent 5,630,204 to Hylton and U.S. Patent 5,225,902 to McMullan.

Regarding claims 1 and 21, Ghori discloses a local area information terminal 405 (figure 4) comprising:

a file storing unit 435 storing a file previously created (storage 435 stores digital data including applications, the windows 95 operating system, and may be used for manipulating text, numbers and graphics, additionally computer 415 may connect to a

LAN or the internet (column 4, line 46-column 6, line 24). The use of the Windows 95 operating system to create or download files via included Windows95 applications such as notepad/WordPad (for creating text documents) and telnet (for connecting and downloading files from a remote computer) is well known since its release in August of 1995 (http://members.fortunecity.com/pcmuseum/windows.htm),

a channel retrieving unit 490(column 7, lines 7-32, column 9, lines 4-23)

a channel selecting unit 490 (column 7, lines 28-33),

a transmitting unit 440 transmitting the file as broadcasting data stored in said file storing unit to within a local area via the selected channel (column 7, lines 45-57).

Ghori does not disclose, a tuner, a microprocessor connected to a tuner, a channel retrieving unit which determines a free channel though which no broadcasting is being conducted by using a tuner in conjunction with a microprocessor, selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency.

Matsuda discloses a wireless system which includes a number of terminals which communicate with a base station (column 7, lines 15-47), a free channel packet is utilized to determine which channels other devices are transmitting on in order to determine an unused channel (column 8, line 54-column 9, line 11, thereby reducing data collisions) the terminal further determines if it is out of range of a particular base station and changes frequencies in order to be able to communicate with a different base station (column 10, lines 47-column 11, line 8). Matsuda inherently makes use of a tuner controlled by a microprocessor as Matsuda discloses that the terminals tune to

multiple channels (column 8, line 28-42) and determine which channels they are to broadcast on by processing received packetized information (column 8, lines 54-column 9, line 10).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify Ghori to utilize the microprocessor, tuner, and free channel determination features as taught by Matsuda, for the advantages of reducing collisions and enabling the terminal to communicate with a base station when it goes out of range of its original base station.

The combination of Ghori and Matsuda fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency. While Matsuda inherently makes use of a tuner controlled by a microprocessor, Matsuda fails to show it connected to the tuner.

Hylton discloses the use of a microprocessor 514 coupled to a tuner 512 within a network interface unit (figure 8), which receives both analog and digital data in response to commands from the microprocessor (column 30, line 11-column 31, line 47), which uses CDMA as well as frequency hopping and can receive any frequency used by the broadcaster. Additionally, the unit provides the advantage of rejecting high powered unwanted signals, while accepting the proper sequence (column 31, lines 39-46).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori and Matsuda to utilize the connection between the processor and tuner as well as the transmission scheme as taught by Hylton for the advantages of providing direct control over the tuner, and rejecting high

powered unwanted signals while accepting the properly formatted desired signals (column 31, lines 39-46).

The combination of Ghori, Matsuda and Hylton fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency.

Maillet discloses a TDMA system, in which the bursts are automatically allocated the lowest numbered channel, if that channel is full, in which case the next lowest numbered slot is assigned (column 2, line 74-column 3, line 30, column 4, lines 55-66), thus reducing congestion, by allocating a lower numbered free channel.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Hylton and Matsuda to utilize the lower number channel selection of Maillet, thus reducing congestion, by allocating a lower numbered free channel.

The combination of Ghori, Matsuda, Hylton and Maillet does not disclose a channel comprising bandwidth defined per frequency of the broadcasting.

McMullan discloses a PPV system in which data is transmitted in up to 60 channels, each of which has a set bandwidth of 100kHz (column 37, lines 58-column 38, line 5), thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton and Maillet to utilize a

channels defines per frequency, as taught by McMullan, thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Regarding claim 2, Ghori discloses a wireless computer network in which data exchanged between two devices is encrypted prior to transmission (column 9, lines 3-6).

Regarding claim 6, Ghori discloses a local area information terminal 405 (figure 4)comprising:

a file storing unit 435 storing a file previously created (storage 435 stores digital data including applications, the windows 95 operating system, and may be used for manipulating text, numbers and graphics, additionally computer 415 may connect to a LAN or the internet (column 4, line 46-column 6, line 24). The use of the Windows 95 operating system to create or download files via included Windows95 applications such as notepad/WordPad (for creating text documents) and telnet (for connecting and downloading files from a remote computer) is well known since its release in August of 1995 (http://members.fortunecity.com/pcmuseum/windows.htm),

a channel retrieving unit 440(column 7, lines 7-32, column 9, lines 4-23)

a channel selecting unit 440 (column 7, lines 28-33),

a transmitting unit 440 transmitting the file as broadcasting data stored in said file storing unit to within a local area via the selected channel (column 7, lines 45-57).

A retrieving unit 490retriving a channel through which the broadcasting data can be received within the local area (column 7, lines 50-57)

A displaying unit (column 8, lines 6-11) displaying the broadcasting data received via that selected channel and wherein the broadcasting data being transmitted within the local area (figure 4).

Ghori does not disclose a tuner, a microprocessor coupled to the tuner, monitoring the communications channels for finding a free channel through which no broadcasting is being conducted by using a tuner in conjunction with a microprocessor, selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency., a selecting unit for selecting data being transmitted on different channels

Matsuda discloses a wireless system which includes a number of terminals which communicate with a base station (column 7, lines 15-47), a free channel packet is utilized to determine which channels other devices are transmitting on in order to determine an unused channel (column 8, line 54-column 9, line 11, thereby reducing data collisions) the terminal further determines if it is out of range of a particular base station and changes frequencies in order to be able to communicate with a different base station (column 10, lines 47-column 11, line 8). Matsuda inherently makes use of a tuner controlled by a microprocessor as Matsuda discloses that the terminals tune to multiple channels (column 8, line 28-42) and determine which channels they are to broadcast on by processing received packetized information (column 8, lines 54-column 9, line 10).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify Ghori to utilize the microprocessor, tuner, and free channel determination features as taught by Matsuda, for the advantages of reducing collisions and enabling the terminal to communicate with a base station when it goes out of range of its original base station.

The combination of Ghori and Matsuda fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency. While Matsuda inherently makes use of a tuner controlled by a microprocessor, Matsuda fails to show it connected to the tuner.

Hylton discloses the use of a microprocessor 514 coupled to a tuner 512 within a network interface unit (figure 8), which receives both analog and digital data in response to commands from the microprocessor (column 30, line 11-column 31, line 47), which uses CDMA as well as frequency hopping and can receive any frequency used by the broadcaster. Additionally, the unit provides the advantage of rejecting high powered unwanted signals, while accepting the proper sequence (column 31, lines 39-46).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori and Matsuda to utilize the connection between the processor and tuner as well as the transmission scheme as taught by Hylton for the advantages of providing direct control over the tuner, and rejecting high powered unwanted signals while accepting the properly formatted desired signals (column 31, lines 39-46).

The combination of Ghori, Matsuda and Hylton fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency.

Maillet discloses a TDMA system, in which the bursts are automatically allocated the lowest numbered channel, if that channel is full, in which case the next lowest numbered slot is assigned (column 2, line 74-column 3, line 30, column 4, lines 55-66), thus reducing congestion, by allocating a lower numbered free channel.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Hylton and Matsuda to utilize the lower number channel selection of Maillet, thus reducing congestion, by allocating a lower numbered free channel.

The combination of Ghori, Matsuda, Hylton and Maillet does not disclose a channel comprising bandwidth defined per frequency of the broadcasting.

McMullan discloses a PPV system in which data is transmitted in up to 60 channels, each of which has a set bandwidth of 100kHz (column 37, lines 58-column 38, line 5), thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda , Hylton and Maillet to utilize a channels defines per frequency, as taught by McMullan, thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

3. Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,282,714-B1 to Ghori in view of U.S. Patent 5,794,116 to Matsuda, U.S. Patent 3,649,764 to Maillet, U.S. Patent 5,630,204 to Hylton and U.S. Patent 5,225,902 to McMullan in further view of U.S. Patent 5,732,074 to Spaur.

Regarding claim 3, Ghori discloses a wireless computer network that can be connected to the Internet (column 6, lines 7-14).

The combination of Ghori, Matsuda, Hylton, Maillet and McMullan does not disclose the exchange of HTML formatted data between computers within the network.

Spaur discloses a wireless network in Figure 2 that consists of a web server 102 with a TCP/IP stack 98 and a number of vehicles 50n (column 6, lines 1-16, column 3, lines 13-24), and utilizes HTML as a common file format. HTML encoding enables the display of data on a wide variety of devices and allows for the customization of the display of data.

Therefore it would have been obvious to one skilled in the art at the time of invention to modify the combined system of Ghori, Matsuda, Hylton, McMullan and Maillet to include the web server and HTML file format of Spaur thus enabling the display of data on a wide variety of devices and allowing for the customization of the display of data.

4. Claims 4, 5, 7, and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,282,714-B1 to Ghori in view of U.S. Patent 5,794,116 to Matsuda,

U.S. Patent 5,630,204 to Hylton , U.S. Patent McMullan and U.S. Patent 3,649,764 to Maillet in further view of U.S. Patent 5,732,074 to Spaur and U.S. Patent 5,974,449 to Chang.

Regarding claims 4, 7 and 8, Ghori discloses a local area information terminal 405 (figure 4) comprising:

a file storing unit 435 storing a file previously created (storage 435 stores digital data including applications, the windows 95 operating system, and may be used for manipulating text, numbers and graphics, additionally computer 415 may connect to a LAN or the internet (column 4, line 46-column 6, line 24). The use of the Windows 95 operating system to create or download files via included Windows95 applications such as notepad/WordPad (for creating text documents) and telnet (for connecting and downloading files from a remote computer) is well known since its release in August of 1995 (http://members.fortunecity.com/pcmuseum/windows.htm),

a channel retrieving unit 440(column 7, lines 7-32, column 9, lines 4-23)

a channel selecting unit 440 (column 7, lines 28-33),

a transmitting unit 440 transmitting the file as broadcasting data stored in said file storing unit to within a local area via the selected channel (column 7, lines 45-57).

A displaying unit (column 8, lines 6-11) displaying the broadcasting data received via the selected channel and wherein the broadcasting data being transmitted within the local area (figure 4)

An identifier storing unit 492 for extracting an identifier for specifying a transmitter out of the broadcasting data and storing the identifier (column 7, lines 58-67, column 8, lines 12-30, I/O control unit recognizes which transceiver pair transmits and receives data in order to relay commands to a computer 405 from a remote location).

Ghori does not disclose a tuner, and a microprocessor coupled to a tuner, monitoring the communications channels for finding a free channel through which no broadcasting is being conducted by using a tune in conjunction with a microprocessor, selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency, a selecting unit for selecting data being transmitted on different channels, mail editing unit and returning unit.

Matsuda discloses a wireless system which includes a number of terminals which communicate with a base station (column 7, lines 15-47), a free channel packet is utilized to determine which channels other devices are transmitting on in order to determine an unused channel (column 8, line 54-column 9, line 11, thereby reducing data collisions) the terminal further determines if it is out of range of a particular base station and changes frequencies in order to be able to communicate with a different base station (column 10, lines 47-column 11, line 8). Matsuda inherently makes use of a tuner controlled by a microprocessor as Matsuda discloses that the terminals tune to multiple channels (column 8, line 28-42) and determine which channels they are to broadcast on by processing received packetized information (column 8, lines 54-column 9, line 10).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify Ghori to utilize the microprocessor, tuner, and free channel determination features as taught by Matsuda, for the advantages of reducing collisions and enabling the terminal to communicate with a base station when it goes out of range of its original base station.

The combination of Ghori and Matsuda fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency, a mail editing unit and returning unit. While Matsuda inherently makes use of a tuner controlled by a microprocessor, Matsuda fails to show it connected to the tuner.

Hylton discloses the use of a microprocessor 514 coupled to a tuner 512 within a network interface unit (figure 8), which receives both analog and digital data in response to commands from the microprocessor (column 30, line 11-column 31, line 47), which uses CDMA as well as frequency hopping and can receive any frequency used by the broadcaster. Additionally, the unit provides the advantage of rejecting high powered unwanted signals, while accepting the proper sequence (column 31, lines 39-46).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori and Matsuda to utilize the connection between the processor and tuner as well as the transmission scheme as taught by Hylton for the advantages of providing direct control over the tuner, and rejecting high powered unwanted signals while accepting the properly formatted desired signals (column 31, lines 39-46).

The combination of Ghori, Matsuda and Hylton fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency.

Maillet discloses a TDMA system, in which the bursts are automatically allocated the lowest numbered channel, if that channel is full, in which case the next lowest numbered slot is assigned (column 2, line 74-column 3, line 30, column 4, lines 55-66), thus reducing congestion, by allocating a lower numbered free channel.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori and Matsuda to utilize the lower number channel selection of Maillet, thus reducing congestion, by allocating a lower numbered free channel.

The combination of Ghori, Matsuda, Hylton and Maillet does not disclose a channel comprising bandwidth defined per frequency of the broadcasting, , mail editing unit and returning unit.

McMullan discloses a PPV system in which data is transmitted in up to 60 channels, each of which has a set bandwidth of 100kHz (column 37, lines 58-column 38, line 5), thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton and Maillet to utilize a channels defines per frequency, as taught by McMullan, thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

The combination of Ghori, Matsuda, Hylton, Maillet and McMullan fails to disclose a identifier storing unit, mail editing unit and returning unit.

Chang discloses a system which transmits messages from a number of different platforms, email messages may be sent over the internet or an intranet and use the IP protocol, a user may user a workstation 140 or pc 138 to create an email or other message to be sent to an intended recipient, a recipient may be identified by an email address, the domain name of the email address (for example, USPTO.GOV) is resolved to an IP address of a mail server via the domain name system scheme, the message is then transmitted to that mail server (column 4, line 1-column 6, line 23), when a user wants to retrieve their messages, such as email, they may connect to the internet, they are then assigned a permanent or temporary IP address, which uniquely identifies their computer for the duration of their session, and the user receives a notification that they have email (column 7, line 62-column 8, line 48), thus enabling a user to receive and send email in order facilitate communications between users.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton, Maillet and McMullan to utilize the IP addressing scheme to identify a recipient and mail server address for an email message, as taught by Chang, thus enabling a user to receive and send email in order facilitate communications between users.

Regarding claim 5, Ghori discloses a wireless computer network that makes use of encryption when sending messages between devices, data which is transmitted can

only be decoded by a device which has access to the appropriate decode key (column 7, lines 20-50).

5. Claims 10, 11,15, 18 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,282,714-B1 to Ghori in view of U.S. Patent 5,794,116 to Matsuda, U.S. Patent 5,630,204 to Hylton, U.S. Patent 3,649,764 to Maillet, U.S. Patent 5,225,902 to McMullan and U.S. Patent 4,555,806 to Lange.

Regarding claim 10, Ghori discloses a local area information terminal 405 (figure 4) comprising:

a file storing unit 435 storing a file previously created (storage 435 stores digital data including applications, the windows 95 operating system, and may be used for manipulating text, numbers and graphics, additionally computer 415 may connect to a LAN or the internet (column 4, line 46-column 6, line 24). The use of the Windows 95 operating system to create or download files via included Windows95 applications such as notepad/WordPad (for creating text documents) and telnet (for connecting and downloading files from a remote computer) is well known since its release in August of 1995 (http://members.fortunecity.com/pcmuseum/windows.htm),

a channel retrieving unit 490(column 7, lines 7-32, column 9, lines 4-23)

a channel selecting unit 490 (column 7, lines 28-33),

a transmitting unit 440 transmitting the file as broadcasting data stored in said file storing unit to within a local area via the selected channel (column 7, lines 45-57).

Ghori does not disclose a tuner, a microprocessor connected to the tuner, monitoring the communications channels for finding a free channel through which no broadcasting is being conducted by using a tuner in conjunction with a microprocessor, selecting a free channel starting from a lower numbered channel, a channel displaying unit that displays the free channels retrieved, or channel bandwidth being defined per frequency.

Matsuda discloses a wireless system which includes a number of terminals which communicate with a base station (column 7, lines 15-47), a free channel packet is utilized to determine which channels other devices are transmitting on in order to determine an unused channel (column 8, line 54-column 9, line 11, thereby reducing data collisions) the terminal further determines if it is out of range of a particular base station and changes frequencies in order to be able to communicate with a different base station (column 10, lines 47-column 11, line 8). Matsuda inherently makes use of a tuner controlled by a microprocessor as Matsuda discloses that the terminals tune to multiple channels (column 8, line 28-42) and determine which channels they are to broadcast on by processing received packetized information (column 8, lines 54-column 9, line 10).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify Ghori to utilize the microprocessor, tuner, and free channel determination features as taught by Matsuda, for the advantages of reducing collisions and enabling the terminal to communicate with a base station when it goes out of range of its original base station.

The combination of Ghori and Matsuda fails to disclose selecting a free channel starting from a lower numbered channel or channel bandwidth being defined per frequency, or a channel displaying unit, which displays the free channels. While Matsuda inherently makes use of a tuner controlled by a microprocessor, Matsuda fails to show it connected to the tuner.

Hylton discloses the use of a microprocessor 514 coupled to a tuner 512 within a network interface unit (figure 8), which receives both analog and digital data in response to commands from the microprocessor (column 30, line 11-column 31, line 47), which uses CDMA as well as frequency hopping and can receive any frequency used by the broadcaster. Additionally, the unit provides the advantage of rejecting high powered unwanted signals, while accepting the proper sequence (column 31, lines 39-46).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori and Matsuda to utilize the connection between the processor and tuner as well as the transmission scheme as taught by Hylton for the advantages of providing direct control over the tuner, and rejecting high powered unwanted signals while accepting the properly formatted desired signals (column 31, lines 39-46).

The combination of Ghori, Matsuda and Hylton, fails to disclose selecting a free channel starting from a lower numbered channel or channel bandwidth being defined per frequency, or a channel displaying unit, which displays the free channels.

Lange discloses a transmitter receiver pair which scans a number of channels to see which channels are free, the free channels are then displayed on a CRT (column 1,

lines 21-59, column 4, line 49-column 5, line 38), thus displaying to the user which channels would receive the clearest signal.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Hylton and Matsuda to utilize the channel display unit of Lange, thus displaying to the user which channels would receive the clearest signal.

The combination of Ghori, Matsuda, Hylton and Lange fails to disclose selecting a free channel starting from a lower numbered channel or channel bandwidth being defined per frequency

Maillet discloses a TDMA system, in which the bursts are automatically allocated the lowest numbered channel, if that channel is full, in which case the next lowest numbered slot is assigned (column 2, line 74-column 3, line 30, column 4, lines 55-66), thus reducing congestion, by allocating a lower numbered free channel.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Hylton, Lange and Matsuda to utilize the lower number channel selection of Maillet, thus reducing congestion, by allocating a lower numbered free channel.

The combination of Ghori, Matsuda, Hylton, Lange and Maillet does not disclose a channel comprising bandwidth defined per frequency of the broadcasting.

McMullan discloses a PPV system in which data is transmitted in up to 60 channels, each of which has a set bandwidth of 100kHz (column 37, lines 58-column

38, line 5), thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton, Lange and Maillet to utilize a channels defines per frequency, as taught by McMullan, thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Regarding claim 11, Ghori discloses a wireless computer network in which data exchanged between two devices is encrypted prior to transmission (column 9, lines 3-6).

Regarding claims 15, 18 and 20, Ghori discloses a local area information terminal 405 (figure 4)comprising:

a file storing unit 435 storing a file previously created (storage 435 stores digital data including applications, the windows 95 operating system, and may be used for manipulating text, numbers and graphics, additionally computer 415 may connect to a LAN or the internet (column 4, line 46-column 6, line 24). The use of the Windows 95 operating system to create or download files via included Windows95 applications such as notepad/WordPad (for creating text documents) and telnet (for connecting and downloading files from a remote computer) is well known since its release in August of 1995 (http://members.fortunecity.com/pcmuseum/windows.htm),

a channel retrieving unit 440(column 7, lines 7-32, column 9, lines 4-23)

a channel selecting unit 440 (column 7, lines 28-33),

a transmitting unit 440 transmitting the file as broadcasting data stored in said file storing unit to within a local area via the selected channel (column 7, lines 45-57).

A retrieving unit 490retriving a channel through which the broadcasting data can be received within the local area (column 7, lines 50-57)

A displaying unit (column 8, lines 6-11) displaying the broadcasting data received via that selected channel and wherein the broadcasting data being transmitted within the local area (figure 4).

Ghori does not disclose monitoring a tuner, or a microprocessor connected to the tuner, the communications channels for finding a free channel through which no broadcasting is being conducted by using a tuner in conjunction with a microprocessor, selecting a free channel starting from a lower numbered channel, a channel displaying unit which displays the free channels retrieved, a free channel displaying unit, or channel bandwidth being defined per frequency.

Matsuda discloses a wireless system which includes a number of terminals which communicate with a base station (column 7, lines 15-47), a free channel packet is utilized to determine which channels other devices are transmitting on in order to determine an unused channel (column 8, line 54-column 9, line 11, thereby reducing data collisions) the terminal further determines if it is out of range of a particular base station and changes frequencies in order to be able to communicate with a different base station (column 10, lines 47-column 11, line 8). Matsuda inherently makes use of a tuner controlled by a microprocessor as Matsuda discloses that the terminals tune to

multiple channels (column 8, line 28-42) and determine which channels they are to broadcast on by processing received packetized information (column 8, lines 54-column 9, line 10).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify Ghori to utilize the microprocessor, tuner, and free channel determination features as taught by Matsuda, for the advantages of reducing collisions and enabling the terminal to communicate with a base station when it goes out of range of its original base station.

The combination of Ghori and Matsuda fails to disclose selecting a free channel starting from a lower numbered channel or channel bandwidth being defined per frequency, a free channel display unit, or a channel displaying unit which displays the free channels. While Matsuda inherently makes use of a tuner controlled by a microprocessor, Matsuda fails to show it connected to the tuner.

Hylton discloses the use of a microprocessor 514 coupled to a tuner 512 within a network interface unit (figure 8), which receives both analog and digital data in response to commands from the microprocessor (column 30, line 11-column 31, line 47), which uses CDMA as well as frequency hopping and can receive any frequency used by the broadcaster. Additionally, the unit provides the advantage of rejecting high powered unwanted signals, while accepting the proper sequence (column 31, lines 39-46).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori and Matsuda to utilize the connection between the processor and tuner as well as the transmission scheme as taught by

Hylton for the advantages of providing direct control over the tuner, and rejecting high powered unwanted signals while accepting the properly formatted desired signals (column 31, lines 39-46).

The combination of Ghori, Matsuda and Hylton, fails to disclose selecting a free channel starting from a lower numbered channel or channel bandwidth being defined per frequency, or a channel displaying unit, which displays the free channels.

Lange discloses a transmitter receiver pair which scans a number of channels to see which channels are free, the free channels are then displayed on a CRT (column 1, lines 21-59, column 4, line 49-column 5, line 38), thus displaying to the user which channels would receive the clearest signal.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda and Hylton to utilize the channel display unit of Lange, thus displaying to the user which channels would receive the clearest signal.

Maillet discloses a TDMA system, in which the bursts are automatically allocated the lowest numbered channel, if that channel is full, in which case the next lowest numbered slot is assigned (column 2, line 74-column 3, line 30, column 4, lines 55-66), thus reducing congestion, by allocating a lower numbered free channel.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda and Hylton to utilize the lower number channel selection of Maillet, thus reducing congestion, by allocating a lower numbered free channel.

The combination of Ghori, Matsuda, Hylton and Maillet does not disclose a channel comprising bandwidth defined per frequency of the broadcasting.

McMullan discloses a PPV system in which data is transmitted in up to 60 channels, each of which has a set bandwidth of 100kHz (column 37, lines 58-column 38, line 5), thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton, and Maillet to utilize a channels defines per frequency, as taught by McMullan, thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

6. Claims 16-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,282,714-B1 to Ghori in view of U.S. Patent 5,794,116 to Matsuda, U.S. Patent 5,630,204 to Hylton, and U.S. Patent 4,555,806 to Lange, U.S. Patent 5,225,902 to McMullan and U.S. Patent 3,649,764 to Maillet in further view of U.S Patent 5,974,449 to Chang.

Regarding claims 16-17, Ghori discloses in Figure 6, a computer 415 (column 6, lines 34-44) with a Digital Transceiver 490 connected to an antenna, a server 605 with a Digital Transceiver 635 coupled to an antenna in server 605 and a file storage area, both transceivers are used for transmitting and receiving encrypted data between the

two devices utilizing spread spectrum modulation and via Digital PCS (column 7, lines 7-32, column 9, lines 4-23).

Ghori, Matsuda, Hylton, Maillet, McMullan and Lange do not disclose the use of an email-editing unit for creating a return mail to a broadcast device.

Chang discloses a system which transmits messages from a number of different platforms, email messages may be sent over the internet or an intranet and use the IP protocol, a user may user a workstation 140 or pc 138 to create an email or other message to be sent to an intended recipient, a recipient may be identified by an email address, the domain name of the email address (for example, USPTO.GOV) is resolved to an IP address of a mail server via the domain name system scheme, the message is then transmitted to that mail server (column 4, line 1-column 6, line 23), when a user wants to retrieve their messages, such as email, they may connect to the internet, they are then assigned a permanent or temporary IP address, which uniquely identifies their computer for the duration of their session, and the user receives a notification that they have email (column 7, line 62-column 8, line 48) thus enabling a user to receive and send email in order facilitate communications between users.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton, Lange, Maillet and McMullan to utilize the IP addressing scheme to identify a recipient and mail server address for an email message, as taught by Chang, thus enabling a user to receive and send email in order facilitate communications between users.

7. Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,282,714-B1 to Ghori in view of U.S. Patent 5,794,116 to Matsuda, U.S. Patent 3,649,764 to Maillet, U.S. Patent 5,630,204 to Hylton U.S. Patent 5,225,902 to McMullan and U.S. Patent 4,555,806 to Lange in further view of U.S. Patent 5,732,074 to Spaur.

Regarding claim 12, Ghori discloses a wireless computer network that can be connected to the Internet (column 6, lines 7-14).

The combined system of Ghori, Matsuda, Hylton, Lange, McMullan, and Maillet does not disclose the exchange of HTML data between computers within the network.

Spaur discloses a wireless network in Figure 2 that consists of a web server 102 with a TCP/IP stack 98 and a number of vehicles 50n (column 6, lines 1-16, column 3, lines 13-24), and utilizes HTML as a common file format. HTML encoding enables the display of data on a wide variety of devices and allows for the customization of the display of data.

Therefore it would have been obvious to one skilled in the art at the time of invention to modify the combined system of Ghori, Matsuda, Hylton, Lange, McMullan and Maillet to include the web server and HTML file format of Spaur thus enabling the display of data on a wide variety of devices and allowing for the customization of the display of data.

8. Claims 13, 14, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 6,282,714-B1 to Ghori in view of U.S. Patent 5,794,116

to Matsuda, U.S. Patent 5,630,204 to Hylton, and U.S. Patent 4,555,806 to Lange in further view of U.S. Patent 5,732,074 to Spaur and U.S Patent 5,974,449 to Chang.

Regarding claims 13 and 19, Ghori discloses a local area information terminal 405 (figure 4) comprising:

a file storing unit 435 storing a file previously created (storage 435 stores digital data including applications, the windows 95 operating system, and may be used for manipulating text, numbers and graphics, additionally computer 415 may connect to a LAN or the internet (column 4, line 46-column 6, line 24). The use of the Windows 95 operating system to create or download files via included Windows95 applications such as notepad/WordPad (for creating text documents) and telnet (for connecting and downloading files from a remote computer) is well known since its release in August of 1995 (http://members.fortunecity.com/pcmuseum/windows.htm),

a channel retrieving unit 440(column 7, lines 7-32, column 9, lines 4-23)

a channel selecting unit 440 (column 7, lines 28-33),

a transmitting unit 440 transmitting the file as broadcasting data stored in said file storing unit to within a local area via the selected channel (column 7, lines 45-57).

A displaying unit (column 8, lines 6-11) displaying the broadcasting data received via the selected channel and wherein the broadcasting data being transmitted within the local area (figure 4)

An identifier storing unit 492 for extracting an identifier for specifying a transmitter out of the broadcasting data and storing the identifier (column 7, lines 58-67, column 8,

lines 12-30, I/O control unit recognizes which transceiver pair transmits and receives data in order to relay commands to a computer 405 from a remote location).

Ghori does not disclose a tuner, and a microprocessor connected to the tuner, monitoring the communications channels for finding a free channel through which no broadcasting is being conducted by using a tuner in conjunction with a microprocessor, selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency, a selecting unit for selecting data being transmitted on different channels, a free channel displaying unit, or mail editing unit and returning unit.

Matsuda discloses a wireless system which includes a number of terminals which communicate with a base station (column 7, lines 15-47), a free channel packet is utilized to determine which channels other devices are transmitting on in order to determine an unused channel (column 8, line 54-column 9, line 11, thereby reducing data collisions) the terminal further determines if it is out of range of a particular base station and changes frequencies in order to be able to communicate with a different base station (column 10, lines 47-column 11, line 8). Matsuda inherently makes use of a tuner controlled by a microprocessor as Matsuda discloses that the terminals tune to multiple channels (column 8, line 28-42) and determine which channels they are to broadcast on by processing received packetized information (column 8, lines 54-column 9, line 10).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify Ghori to utilize the microprocessor, tuner, and free channel

determination features as taught by Matsuda, for the advantages of reducing collisions and enabling the terminal to communicate with a base station when it goes out of range of its original base station.

The combination of Ghori and Matsuda fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency, a free channel displaying unit, or mail editing unit and returning unit. While Matsuda inherently makes use of a tuner controlled by a microprocessor, Matsuda fails to show it connected to the tuner.

Hylton discloses the use of a microprocessor 514 coupled to a tuner 512 within a network interface unit (figure 8), which receives both analog and digital data in response to commands from the microprocessor (column 30, line 11-column 31, line 47), which uses CDMA as well as frequency hopping and can receive any frequency used by the broadcaster. Additionally, the unit provides the advantage of rejecting high powered unwanted signals, while accepting the proper sequence (column 31, lines 39-46).

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori and Matsuda to utilize the connection between the processor and tuner as well as the transmission scheme as taught by Hylton for the advantages of providing direct control over the tuner, and rejecting high powered unwanted signals while accepting the properly formatted desired signals (column 31, lines 39-46).

The combination of Ghori, Matsuda and Hylton, fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency, a free channel displaying unit, or mail editing unit and returning unit.

Lange discloses a transmitter receiver pair which scans a number of channels to see which channels are free, the free channels are then displayed on a CRT (column 1, lines 21-59, column 4, line 49-column 5, line 38), thus displaying to the user which channels would receive the clearest signal.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda and Hylton, to utilize the channel display unit of Lange, thus displaying to the user which channels would receive the clearest signal.

The combination of Ghori , Lange, Hylton and Matsuda fails to disclose selecting a free channel starting from a lower numbered channel or the channel's bandwidth is defined per frequency, or mail editing unit and returning unit.

Maillet discloses a TDMA system, in which the bursts are automatically allocated the lowest numbered channel, if that channel is full, in which case the next lowest numbered slot is assigned (column 2, line 74-column 3, line 30, column 4, lines 55-66), thus reducing congestion, by allocating a lower numbered free channel.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Lange, Hylton, and Matsuda to utilize the lower number channel selection of Maillet, thus reducing congestion, by allocating a lower numbered free channel.

The combination of Ghori, Matsuda, Hylton, Lange and Maillet does not disclose a channel comprising bandwidth defined per frequency of the broadcasting, , mail editing unit and returning unit.

McMullan discloses a PPV system in which data is transmitted in up to 60 channels, each of which has a set bandwidth of 100kHz (column 37, lines 58-column 38, line 5), thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton, Lange and Maillet to utilize a channels defines per frequency, as taught by McMullan, thus reducing crosstalk per frequency, by defining each channel and utilizing a different set of frequencies.

The combination of Ghori, Matsuda, Maillet, Hylton, Lange and McMullan fails to disclose a identifier storing unit, mail editing unit and returning unit.

Chang discloses a system which transmits messages from a number of different platforms, email messages may be sent over the internet or an intranet and use the IP protocol, a user may user a workstation 140 or pc 138 to create an email or other message to be sent to an intended recipient, a recipient may be identified by an email address, the domain name of the email address (for example, USPTO.GOV) is resolved to an IP address of a mail server via the domain name system scheme, the message is then transmitted to that mail server (column 4, line 1-column 6, line 23), when a user wants to retrieve their messages, such as email, they may connect to the internet, they are then assigned a permanent or temporary IP address, which uniquely identifies their

computer for the duration of their session, and the user receives a notification that they have email (column 7, line 62-column 8, line 48), thus enabling a user to receive and send email in order facilitate communications between users.

Therefore, it would have been obvious to one skilled in the art at the time of invention to modify the combination of Ghori, Matsuda, Hylton, Lange, Maillet and McMullan to utilize the IP addressing scheme to identify a recipient and mail server address for an email message, as taught by Chang, thus enabling a user to receive and send email in order facilitate communications between users.

Regarding claim 14, Ghori discloses a wireless computer network that makes use of encryption when sending messages between devices, data which is transmitted can only be decoded by a device which has access to the appropriate decode key (column 7, lines 20-50).

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hunter B. Lonsberry whose telephone number is 571-272-7298. The examiner can normally be reached on Monday-Friday during normal business hours.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Miller can be reached on 571-272-7353. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

HBL

SCOTT E. BELIVEAU
PRIMARY PATENT EXAMINER